OBSERVATION REPORT #49

During the Provisioning Verification of High Capacity DS1 circuits, KPMG Consulting identified a significant deviation between the Estimated Measured Loss (EML) and the Actual Measured Loss (AML) on 15 DS1 circuits when deploying Genius Jacks.

Issue

The M&P documentation (RCCC Coordinator's Guide DS1 Unbundled Loop Service – RCO-98-0026) states the AML for DS-1 hand-offs must meet 2 requirements:

1) The AML should read between 0.0db to –15.db.
2) The AML shall not deviate more than +/- 2.0db from the EML that appears on the WORD (Word Order Record Design) Document. (It should be noted that another section of the M&P also states that this deviation should not exceed +/-1.5db).

All DS-1 circuits verified were provisioned on fiber optic equipment. Verizon internal methods and procedures state that fiber multi-plexers will have a 0.0db EML, though this parameter does not appear on the WORD Document. KPMG Consulting did not observe Verizon-NJ personnel taking initial power readings during the provisioning of these DS1 circuits. It is important to take initial power readings for the following reasons:

1.) Assure that the AML falls into the acceptable range.
2.) Detect an EML/AML mismatch that could indicate an improperly designed circuit.
3.) Establish a performance benchmark for future maintenance reports.

The following circuits were observed to have been initially provisioned with the incorrect measured loss setting with deviations greater than allowable:

Item	Circuit ID: ECCKT	EML Reading – Genius Jack	AML Reading - Genius Jack	Expected AML Reading Range
1	HFCU.147999.NJ	0.0db	-6.8db	0.0db to –15.0db
2	HFCU.147756.NJ	0.0db	-7.5db	0.0db to –15.0db
3	HFCU.147998.NJ	0.0db	-6.5db	0.0db to –15.0db
4	HFCU.147984.NJ	0.0db	-6.0db	0.0db to –15.0db
5	HFCU.147987.NJ	0.0db	-6.5db	0.0db to –15.0db
6	HFCU.147988.NJ	0.0db	-6.0db	0.0db to –15.0db
7	HFCU.147993.NJ	0.0db	-6.5db	0.0db to –15.0db
8	HFCU.147758.NJ	0.0db	-7.5db	0.0db to –15.0db
9	HFCU.148018.NJ	0.0db	-7.0db	0.0db to –15.0db
10	HFCU.148021.NJ	0.0db	-7.0db	0.0db to –15.0db
11	HFCU.148015.NJ	0.0db	-7.0db	0.0db to –15.0db
12	HFCU.148340.NJ	0.0db	-7.0db	0.0db to –15.0db
13	HFCU.148016.NJ	0.0db	-7.5db	0.0db to –15.0db
14	HFCU.148342.NJ	0.0db	-7.5db	0.0db to –15.0db
15	HFCU.148339.NJ	0.0db	-7.5db	0.0db to –15.0db

These circuits were provisioned within the acceptable AML range, but the AML deviated too far from the EML.

Assessment

Had Verizon-NJ verified the initial power settings, these errors could have been detected. These incorrect power settings could adversely affect CLEC equipment (channel banks, etc.) resulting in higher maintenance and replacement costs. This situation can also result in added expense for the CLEC to install extension repeaters.